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**High Bandwidth Large Stroke Spin-stand**  
**for Data Storage Component Testing**

**Abstract of the Disclosure**

10 A high bandwidth, large stroke spin-stand for testing components of a disc drive includes  
a coarse positioning stage and a rotary micropositioning stage. The spin-stand is capable of  
positioning a transducer head relative to the data storage disc based on one or both of: (1) an  
angular position of a rotary actuator arm in the rotary micropositioning stage; and (2) servo data  
read from the data storage disc. The angular position of the rotary actuator arm is detected by an  
encoder. In one embodiment, position adjustments are based on the detected angular position. In  
5 another embodiment, position adjustments are based on servo data read from the data storage  
disc, but are also conditional on angular position being consistent with the servo data. In yet  
another embodiment, both angular position and servo data from a track are linearized to generate  
PES adjustment parameters that are recorded on the data storage disc to redefine the track as  
10 more circular or to linearize the PES.